

**IN THE UNITED STATES DISTRICT COURT
FOR THE DISTRICT OF DELAWARE**

CIRBA INC. (d/b/a DENSIFY)
and CIRBA IP, INC.,

Plaintiffs,

v.

VMWARE, INC.,

Defendant.

C.A. No. 19-742-LPS

REDACTED - PUBLIC VERSION

**DEFENDANT VMWARE'S OPENING BRIEF IN SUPPORT OF
MOTIONS FOR JUDGMENT AS A MATTER OF LAW, FOR A NEW TRIAL
AND REMITTITUR, AND TO DISMISS CIRBA INC. FOR LACK OF STANDING**

Dated: March 9, 2020
Redacted Version: March 16, 2020
OF COUNSEL:

Arturo J. González
Michael A. Jacobs
Richard S. J. Hung
MORRISON & FOERSTER LLP
425 Market Street
San Francisco, CA 94105
(415) 268-7000
agonzalez@mofo.com
mjacobs@mofo.com
rhung@mofo.com

Deanne E. Maynard
Brian R. Matsui
MORRISON & FOERSTER LLP
2000 Pennsylvania Avenue, NW Suite 6000
Washington, D.C. 20006
(202) 887-1500
dmaynard@mofo.com
bmatsui@mofo.com

Seth P. Waxman
Thomas G. Saunders
WILMER CUTLER PICKERING HALE
AND DORR LLP
1875 Pennsylvania Avenue, NW
Washington, DC 20006
(202) 663-6000

YOUNG CONAWAY STARGATT &
TAYLOR, LLP

Anne Shea Gaza (No. 4093)
Robert M. Vrana (No. 5666)
Samantha G. Wilson (No. 5816)
Rodney Square
1000 North King Street
Wilmington, DE 19801
(302) 571-6600
agaza@ycst.com
rvrana@ycst.com
swilson@ycst.com

Attorneys for VMware, Inc.

seth.waxman@wilmerhale.com
thomas.saunders@wilmerhale.com

William F. Lee
WILMER CUTLER PICKERING HALE
AND DORR LLP
60 State Street
Boston, MA 02109
(617) 526-6000
william.lee@wilmerhale.com

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TABLE OF ABBREVIATIONS

U.S. Patent No. 8,209,687	“the ’687 patent” or “’687”
U.S. Patent No. 9,654,367	“the ’367 patent” or “’367”
vRealize Operations	“vROps”
Distributed Resource Scheduler	“DRS”
Distributed Resource Scheduler as existed in 2006	“DRS 2006”
Distributed Resource Scheduler as existed in 2010	“DRS 2010”
Fault Tolerance	“FT”
High Availability	“HA”
Transparent Page Sharing	“TPS”
Storage DRS	“SDRS”
Virtual Machine or Virtual Guest	“VM”
Virtual Host	“host”
Preliminary Injunction	“PI”
Trial Transcript ¹	“TT”
Judgment as a Matter of Law	“JMOL”
Declaration of Richard S.J. Hung	“Decl.”

¹ Citations to the Trial Transcript (“TT”) are to the transcripts of the jury trial held January 13, 2020 through January 24, 2020, filed at D.I. 587 through D.I. 597.

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NATURE AND STAGE OF PROCEEDINGS

VMware moves to renew its JMOL motion, for a new trial and remittitur, and to dismiss.

SUMMARY OF ARGUMENT

JMOL is warranted because Cirba did not offer substantial evidence that: (1) VMware directly or indirectly infringed the '687 patent's method claims; (2) the accused products perform the '687 patent's required evaluations; (3) vROps's "allocation ratio" meets the '367 patent's required "operational policy"; (4) pre-vROps 7.5 versions infringe the '367 patent; and (5) VMware willfully infringed the '687 or '367 patent. If DRS 2010 infringes the '687 patent, no reasonable jury could have found that DRS 2006 does not anticipate. The damages award must be set aside or remitted, as Cirba did not support pre-suit damages, correlate damages to actual infringement, or properly apportion. Alternatively, a new trial is proper for the same reasons, Cirba's prejudicial statements in closing argument, and Cirba Inc.'s lack of standing.

BACKGROUND

Cirba originally sought a PI against VMware's vROps 7 product for infringing the '687 patent. (D.I. 11.) Although acknowledging that VMware's and Cirba's products historically "worked together," Cirba alleged that vROps 7's 2018 launch put VMware "in direct, viable competition" with Cirba "for the first time." (D.I. 12 at 1, 9-10.) After PI discovery, Cirba modified its theory to allege that vROps 7 infringed when combined with DRS, an optional component of VMware's vSphere flagship product. (D.I. 103 at 6.) The Court denied the PI, but set an "extremely expedited" trial schedule (D.I. 138 at 199:21-200:1) without "full blown summary judgment practice" (TT 1157:7-8). (*See also* D.I. 138 at 202:25-203:11.)

In view of DRS's much higher revenues, Cirba pivoted post-PI to an infringement theory focused on DRS, even though it had been released in 2006 and Cirba had never accused it of infringement. In fact, Cirba had publicly distinguished DRS from its own patented technology as

“reactive” and exhibiting “low-level intelligence.” (DTX-5328 at 9:17; TT 376:23-380:3.)

At trial, Cirba’s expert Vijay Madiseti presented an infringement theory based on DRS “affinity” rules and other features. He opined that when VMware customers enable these rules and features, DRS applies technical, business, and workload constraints to evaluate each VM against (i) each host and (ii) other VMs. But he never explained why VMware’s customers would use these features together or showed that anyone actually performed these evaluations. And although he cited to source code, he never explained how that proved infringement—much less infringement on a scale to support a \$233 million damages award.

ARGUMENT

I. JMOL FOR THE ’687 PATENT IS WARRANTED

JMOL is proper if a “reasonable jury would not have a legally sufficient basis to find for [a] party,” *i.e.*, if its findings are not supported by substantial evidence. Fed. R. Civ. P. 50(a)(1); *GlaxoSmithKline LLC v. Teva Pharms. USA, Inc.*, 313 F. Supp. 3d 582, 588 (D. Del. 2018).

A. Non-Infringement: No Substantial Evidence That VMware or Its Customers Actually Use DRS & vROps Products to Perform the Claimed ’687 Methods

Unlike system claims, claims on computer-implemented methods are infringed only if “all of the steps in the claimed methods” are performed. *Mirror Worlds, LLC v. Apple Inc.*, 692 F.3d 1351, 1358-62 (Fed. Cir. 2012) (affirming JMOL where customers could use software to infringe but no evidence showing actual use). Cirba did not present substantial evidence that VMware or its customers actually practiced the ’687 method claims, warranting JMOL.

1. Claims 3 & 7 Require Both “Each-Host” & “Other-VM” Evaluations for Three Constraint Types

“[T]o prove direct infringement, a patentee must either [A] point to specific instances” or “[B] show that the accused device necessarily infringes the patent in suit.” *ACCO Brands, Inc. v. ABA Locks Mfr. Co.*, 501 F.3d 1307, 1313 (Fed. Cir. 2007). As Dr. Madiseti agreed that neither

DRS nor vROps necessarily infringes, he had to prove actual use. (TT 632:20-23 (“Q. And it isn’t enough that you just enabled DRS; true, sir? You have to do more in order to infringe the [’687] method steps . . . ; true, sir? A. Yes.”); TT 622:5-16 (vROps opinion depends on DRS)).

But to show actual use, Dr. Madisetti had to show that ’687 claim’s steps 7B and 3A were met. Those steps require “evaluating each virtual guest against each virtual host and other virtual guests using one or more rule sets pertaining to said technical, business, and workload constraints.” (PTX-1001, claims 3 and 7.) Restated, each VM in the existing virtualized environment must be evaluated using rule sets for all three constraints against (1) each host (the “Each-Host” evaluations) and (2) other VMs (the “Other-VM” evaluations). These requirements are strict. Dr. Madisetti agreed that, if even one VM in an existing virtualized environment is evaluated pursuant to rule sets with only business and technical but *not* workload constraints, there is no infringement. (TT 618:1-20; D.I. 511 at DDX-3.3.) This is true even if all other VMs in the environment are evaluated with three constraint types for both evaluations. (TT 618:1-20.)

2. The Accused Functionality Is Optional

Dr. Madisetti’s infringement theory for steps 7B and 3A depended on various optional rules and features. Chief among these were VM-VM and VM-host affinity/anti-affinity rules (or the similar Compute Policies), or “optional DRS rules.” (*See, e.g.*, TT 483:8-25, 498:20-500:7, 1413:2-3 (“DRS works without DRS rules”).) Dr. Madisetti pointed to multiple optional DRS rules to satisfy the “technical” and “business” constraints requirements for both the Each-Host and Other-VM evaluations. (TT 487:1-2, 491:13-15, 499:17-500:7.) A customer must affirmatively create these optional rules by “select[ing]” the particular VMs or hosts to which the rule applies. (PTX-2057 at 98-99; *see also* PTX-1648 at 9-10, 12 (Compute Policies also created on a per-VM basis).) Additionally, optional DRS rules can be created for any number of

reasons. Mr. Hillier described the optional DRS rules that were either a “business constrain[t]” or a “technical [constraint]” based on its customer-specified purpose. (TT 261:7-263:13.)

Dr. Madisetti also pointed to various features independent of DRS—FT, HA, TPS, and SDRS (the “optional non-DRS features”)—to satisfy the technical and business constraints. (*Id.* 492:11-500:7.) A customer must enable and configure how specific VMs or hosts operate with these features. (*See, e.g.*, PTX-2062 at 55 (FT enabled for “individual [VMs]”); *id.* 30-34 (HA cluster must be created “before you add host nodes”); PTX-2057 at 42, 128-129 (TPS enabled by “set[ting] advanced attributes for a host”); *id.* 113-17 (creating SDRS rules for specific VMs).) Many of these features are incompatible or discouraged. (PTX-2062 at 46 (when SDRS is enabled, “do not deploy [HA]”); *id.* 51 (explaining that one “cannot invoke” SDRS and FT in the same environment); *id.* 66 (DRS and FT do not work correctly together); PTX-2057 at 30 (recommending against TPS, which is “disabled by default” for “security concerns”).)

3. Some Use of DRS Rules or Non-DRS Features Is Not Enough

As noted, the optional DRS rules and non-DRS features require users to enable and configure them on a per-VM or host basis. To prove infringement of the Each-Host and Other-VM evaluations, Cirba had to show more than the use of these rules and features with *some* VMs and hosts. It had to show that VMware or its customers enabled enough of these rules and features so that the required evaluations of each VM use *all three* constraints.

For example, for the “business” constraint in the Other-VM evaluation, Dr. Madisetti relied on VM-VM DRS rules and the non-DRS FT feature, both optional. (TT 498:20-500:7.) To prove infringement, Cirba needed to show that VMware or its customers created a VM-VM DRS rule “based on a business parameter,” as opposed to other parameter types, or enabled FT for *every* VM in the virtualized environment. (D.I. 356 at 15.) But typical environments have

“thousands or tens of thousands” of VMs on hundreds or thousands of hosts. (TT 656:24-657:2.)

This showing required more than pointing to the possibility that *some* VM or hosts might have these features enabled and configured. Cirba failed to do this.

4. Cirba Did Not Show that VMware Directly Infringes

To show that VMware itself infringed the '687 patent, Cirba had to show that VMware actually performed the claimed methods. Neither the sale of DRS software nor its mere capability to perform the claimed methods was sufficient. *See Mirror Worlds*, 692 F.3d at 1358-62. Cirba's limited evidence on VMware's own product usage did not prove infringement.

Cirba never showed that, when using its products, VMware enabled and configured the optional DRS rules and non-DRS features to evaluate each VM against each host and other VMs using all three business constraints. VMware employee Chandra Prathuri's testimony that VMware tested its products (TT 905:13-907:2) is devoid of detail as to how the products were configured. JMOL of no direct infringement by VMware thus is warranted. *See Lucent Techs., Inc. v. Gateway, Inc.*, 543 F.3d 710, 723 (Fed. Cir. 2008) (“*Lucent I*”) (JMOL where optional source code functionality insufficient to show method claim infringement).

5. Cirba Did Not Show that VMware Indirectly Infringes

To prove inducement, Cirba had to show both that VMware's customers directly infringe and that VMware “affirmative[ly] inten[ded]” that this occur. *HZNP Meds. LLC v. Actavis Labs. UT, Inc.*, 940 F.3d 680, 701-02 (Fed. Cir. 2019). Cirba failed to present substantial evidence of either requirement or of contributory infringement, which was not put to the jury at all.

a) Cirba's “Likely Infringement” Theory Was Insufficient

Lacking direct evidence that any customer carried out all the claimed steps, Dr. Madisetti testified only that it was “very likely” that customers did so. (TT 648:20-649:3, 632:24-636:13 (“[W]hen you have a product that has infringing uses and you encourage the customer to do that,

[it is] likely to do that.”).) But even that heavily-qualified and speculative statement applied only to large customers. (*Id.* 648:20-649:3.) And it was contrary to evidence that one large customer, [REDACTED] did not use DRS (*id.* 637:23-638:17, 644:12-16) and Mr. Hillier’s recognition that satisfying the Each-Host requirement would be “wildly impractical” for large customers and rare even for small customers. (*Id.* 358:24-359:7, 644:24-646:2.) Courts rejected such “likely infringement” theories as insufficient. *See Lucent I*, 543 F.3d at 722 (JMOL where expert testified only that infringing use was “probably ‘very common’”); *Action Star Enter. Co. v. Kaijet Tech. Int’l*, No. 12-cv-8074, 2014 WL 11396253, at *6-7 (C.D. Cal. Apr. 18, 2014) (non-infringement despite assertion that “it [was] more likely than not” that consumers would infringe).

b) Cirba’s Exemplary Customers Were Insufficient

The only VMware customer for which Cirba introduced evidence regarding a specific DRS rule configuration was [REDACTED]. From a list of 764 VMs, its CTO Andrew Hillier described a single associated DRS rule and constraint type for four VMs. (TT 260:15-264:3; PTX-3498.) But Cirba offered no proof that all 764 VMs were evaluated against each host and other VMs using the three required constraints. For example, it offered no evidence that [REDACTED] configured its environments so that each VM had a DRS VM-VM affinity rule based on a business parameter or used FT, which, as discussed, was required under Dr. Madisetti’s theories. In fact, a review of the [REDACTED] exhibit shows that only 143 of the 764 VMs had a VM-VM DRS rule, and Cirba did not identify any rule as based on a business parameter. (PTX-3498 (rows 1-143).) [REDACTED] environment thus was far from possibly infringing. *See ACCO*, 501 F.3d at 1313 (JMOL where patentee did not “point to specific instances of direct infringement”); *SRI Int’l Inc. v. Internet Sec. Sys., Inc.*, 647 F. Supp. 2d 323, 337 (D. Del. 2009) (same).

Dr. Madisetti’s evidence of [REDACTED] use of DRS rules without evidence of

their specific configurations also was insufficient. (TT 585:14-586:19; PTX-1841.) Cirba made no showing that either customer configured each VM in their virtual environments with the three required constraints for Each-Host and Other-VM evaluations. *See ACCO*, 501 F.3d at 1312-13.

c) Cirba’s Survey and Other Usage Information Was Insufficient

Cirba’s scant survey evidence did not show infringement. While a VMware presentation (PTX-1106) stated that 87% of clusters have both DRS affinity and anti-affinity rules enabled (TT 541:12-23), it nowhere suggested that any customer enabled and applied those rules to every VM to meet any relevant constraint for both evaluations. The same is true of Cirba’s reliance on a survey of 26 customers using VM-host affinity rules. (TT 544:20-545:14; PTX-3368 at 5.)

Nor did Dr. Madisetti’s reliance on Hands-On customer labs, simulations, or customer comments provide substantial evidence of infringement. (TT 543:11-544:6.) He offered no evidence that the customers configured the optional DRS rules and non-DRS features in an infringing manner. Likewise, customer comments about “Compute Policies” (an optional feature like DRS rules) showed at most knowledge of that feature, not infringing usage. (*Id.* 546:8-548:9, 585:14-586:10; PTX-1648 at 13-15, 21-23; PTX-1841 at 1.) *See Mirror Worlds*, 692 F.3d at 1359-61 (descriptions and user reviews insufficient to show customer’s actual usage).

Dr. Madisetti’s inability to muster evidence that any customer infringed was unsurprising in view of the optional nature of DRS rules and the cited non-DRS features. He admitted that small customers were unlikely to write DRS rules (TT 630:1-8, 632:20-23, 645:18-23), and, as noted above, Mr. Hillier testified that “Each-Host” evaluations would be “wildly impractical” for large customers and rare even in small customers. (*Id.* 358:24-359:7, 644:24-646:2.)

d) There Is No Substantial Evidence that VMware Had the Requisite Intent to Induce Its Customers to Directly Infringe

Inducement also “requires knowledge that the induced acts constitute infringement.”

Commil USA, LLC v. Cisco Sys., Inc., 135 S. Ct. 1920, 1926 (2015) (quoting *Global-Tech Appliances, Inc. v. SEB S.A.*, 563 U.S. 754, 766 (2011)). Cirba had to prove that VMware affirmatively induced direct infringement and knew the induced actions infringed. *See Power Integrations, Inc. v. Fairchild Semiconductor Int’l, Inc.*, 843 F.3d 1315, 1332 (Fed. Cir. 2016). “Merely describing the infringing use, or knowing of the possibility of infringement, [is] not suffic[ient].” *HZNP*, 940 F.3d at 701-02. Cirba had to show that VMware “encourage[d], recommend[ed], or promot[ed]” its customers’ infringement with the requisite scienter. *Id.*

Cirba presented no evidence that VMware knew it was inducing infringement. VMware could not have intended that its customers infringe when it added the accused functionality to DRS 2010, as the ’687 patent had not issued yet. Even as of July 2019, Cirba cannot show that VMware believed that it infringed, as the Court denied the PI in view of the “more persuasive” testimony by VMware’s expert Jason Nieh on non-infringement. (D.I. 138 at 192:20-194:18.)

The limited evidence that Cirba adduced about VMware’s knowledge of the ’687 patent—Mr. Prathuri’s discovery of its abstract on Cirba’s website during the acquisition discussions (TT 885:1-25)—could not show intent, as mere knowledge of a patent is insufficient. *See Commil USA*, 135 S. Ct. at 1926. Nor were Dr. Madiseti’s citations to VMware documents sufficient, as none showed that VMware encouraged use of the requisite optional DRS rules and non-DRS features for all VMs and hosts. *See HZNP*, 940 F.3d at 701-02 (product instructions that did not “require” customers to perform method insufficient to “encourage infringement”).

B. Non-Infringement: Substantial Evidence Does Not Support that Accused Products Can Perform the Claimed Methods, Even if Configured

Cirba also failed to present substantial evidence that VMware or customer environments as configured pursuant to Cirba’s theory of infringement actually infringed. Nor did Cirba controvert the evidence that certain hosts always skip the “workload” constraint.

1. There Is No Substantial Evidence that DRS Performs the Required Evaluations Using All Three Constraints (Claims 3 and 7)

Although Dr. Madisetti ploddingly stepped through claims 3 and 7's limitations with the jury, he paid only lip service to how the optional DRS rules and non-DRS features perform the Each-Host and Other-VM evaluations. For each of the 35+ slides addressing the claimed evaluations, Dr. Madisetti provided the same formulaic response to counsel's question: he would recite a source code function's name or read a passage from a document, and then proclaim the limitations satisfied—without more. (*See, e.g.*, TT 498:20-500:7, 503:23-505:23.)

Such conclusory testimony is not substantial evidence. *See Dynacore Holdings Corp. v. U.S. Philips Corp.*, 363 F.3d 1263, 1278 (Fed. Cir. 2004) (expert's "unsupported conclusion" on "ultimate issue of infringement" insufficient to prove infringement); *Kim v. ConAgra Foods, Inc.*, 465 F.3d 1312, 1320 (Fed. Cir. 2006) (JMOL of non-infringement where expert "offered conclusory testimony" unsupported by "examinations or tests of the actual accused products").

This is especially true in view of Mr. Hillier's acknowledgement that DRS does not "analyz[e] the various constraints" in the "same way" as Cirba's patented technology. (TT 346:16-21.) Instead, DRS "necessarily does fewer computations" to achieve greater speed. (*Id.* 379:24-380:3.) And Dr. Nieh explained, when DRS determines that a host is incompatible, it skips further evaluations, including any involving "workload" constraints, defeating infringement. (*Id.* 1303:23-1304:15, 1309:5-1310:17, 1318:16-1320:3.) Nor was Dr. Madisetti's testimony sufficient in view of the contrary explanations by Carl Waldspurger, DRS's architect, and Dr. Nieh. Using documents, source code, and testing (TT 1311:6-23, 1312:14-25, 1321:10-1323:15, 1332:3-1334:6, 1337:1-1338:19), both witnesses explained that DRS skips evaluating the "workload" constraint in several scenarios, *e.g.*, when evaluating (1) a VM against incompatible hosts (*id.* 1268:3-14, 1308:21-1310:17); (2) a VM against its source host (*id.*

1268:15-21, 1310:23-1311:23); (3) a VM against heavily loaded hosts (*id.* 1312:20-22); and (4) grouped VMs against any host (*id.* 1312:23-25).

Even a single skipped evaluation proves non-infringement. (D.I. 356 at 7 (Court noting that “adding a physical machine . . . solely for the purpose of excluding that single machine from the comparison analysis” would avoid infringement).) But Cirba did not substantively cross-examine either witness, and Dr. Madisetti offered no substantial contradictory evidence on rebuttal. For incompatible hosts, Dr. Madisetti agreed that if a host is “not in the compatibility set,” the VM is incompatible and cannot run on that host. (TT 1612:18-23.) In that circumstance, the workload evaluation would not be performed. For source hosts, he merely stated that, “in all cases [whether a source or other hosts], you are applying a rule in the context of workload.” (*Id.* 1614:18-1615:4.) But he did not identify the alleged “workload” rule that applied to any source host or elaborate further. For heavily loaded hosts and grouped VMs, he provided no rebuttal at all. (*Id.* 1614:2-1618:14.)

As Dr. Madisetti’s testimony fell far short of proving the use of all three constraints to perform the Each-Host and Other-VM evaluations for each VM, JMOL is warranted. *See Commil USA, LLC v. Cisco Sys., Inc.*, 813 F.3d 994, 996-97 (Fed. Cir. 2015) (reversing JMOL denial where patentee’s expert failed to “provide evidence or reasonable support” for opinion that method step was performed); *Ericsson, Inc. v. D-Link Sys., Inc.*, 773 F.3d 1201, 1223-24 (Fed. Cir. 2014) (reversing JMOL denial despite expert’s testimony that “accused products met each and every limitation of the claims,” where expert conceded that limitation was not met).

2. JMOL Should Be Granted as to Claim 3

JMOL also should be granted as to ’687 claim 3 for three independent reasons. And because the jury did not award damages by claim or product, JMOL as to any claim or product

requires a new trial on damages for the '687 patent. *See infra* Section V.D.

No substantial evidence that all products infringe claim 3. Dr. Madisetti split his infringement analysis into three product “groups”: (1) vSphere with DRS; (2) vROps with DRS; and (3) VMC on AWS with DRS 2.0. (TT 468:19-469:9.) For claim 3, he addressed only Group 1 and admitted he had not analyzed Groups 2 and 3. (*Id.* 586:24-587:8, 593:22-594:3.) But the jury still found that Groups 2 and 3 infringed claim 3. The lack of substantial evidence requires JMOL. *See Power Integrations, Inc. v. Fairchild Semiconductor Int’l Inc.*, 935 F. Supp. 2d 747, 756-58 (D. Del. 2013), *aff’d in relevant part*, 843 F.3d 1315 (Fed. Cir. 2016) (plaintiff must prove infringement “on a product-by-product basis,” even where products are similar).

No substantial evidence the accused products satisfy the “based on” requirement.

Limitation 3A recites an “Each-Host” limitation like claim 7’s, *i.e.*, that each VM be evaluated against each host using three types of constraints. Dr. Madisetti relied on DRS to satisfy limitation 3A. (TT 588:2-14, 591:21-592:15.) Limitation 3B requires: “*based on said analyzing* [from limitation 3A], determining” the virtual server most suitable for conversion (emphasis added). Dr. Madisetti relied on vSphere upgrades to satisfy limitation 3B, but never addressed how the upgrades meet the “based on” requirement. (*Id.* 592:17-593:4.) Indeed, the combination of vSphere upgrades with DRS cannot infringe, as the former is not “based on” an analysis involving the latter. It is undisputed that DRS is disabled during the vSphere upgrade process. (*Id.* 1342:1-1344:17, 1621:2-1622:6.) Dr. Madisetti further admitted that he was not relying on DRS for limitation 3B at all. (*Id.* 1622:5-6 (“So 3A is the only portion where I rely upon DRS.”)). As infringement is impossible, JMOL should be granted.

No substantial evidence the accused products meet the “V2V transformation” requirement. VMware’s products likewise are not capable of performing a “virtual to virtual

(V2V) transformation . . . by conversion from one virtualized *platform* to another virtualized *platform*.” Dr. Madisetti only testified that DRS meets this limitation by facilitating *upgrades* from one version of vSphere to another. (TT 591:8-594:3.) At trial, Cirba offered no evidence that merely upgrading vSphere versions qualifies as a “transformation” or platform “conversion.” “Transform[ation]” means to “[t]o change markedly the appearance or form of.” (Decl. Ex. 1.) When discussing “platform” conversions, the ’687 patent describes moving from a VMware environment to a Microsoft Hyper-V environment, not upgrades. (PTX-1001 at 6:17-21.) As Dr. Madisetti’s theory lacks support, JMOL of non-infringement of claim 3 is proper.

C. Non-Infringement: Dr. Madisetti’s Opinions Should Have Been Excluded

VMware’s pretrial *Daubert* motion challenged Dr. Madisetti’s source code opinions as conclusory and unsupported. (D.I. 417 at 4-9.) The Court ultimately limited him to opinions disclosed in his expert report or at his deposition, but did not otherwise preclude him from offering “black box” opinions lacking explanation. (D.I. 476; D.I. 586 at 85:11-87:9.) VMware’s concerns proved correct. As described above, he offered ultimate “black-box” infringement opinions based on source code—but failed to articulate how it showed infringing use. *Lucent I*, 543 F.3d at 723. As Dr. Madisetti’s testimony should not have been permitted, and no substantial evidence supports the infringement verdict without it, JMOL is warranted.

D. Invalidity: DRS 2006 Anticipates ’687 Patent Claims 3 and 7

If the jury’s infringement verdict stands, JMOL of anticipation is warranted. The Court “must consider un rebutted evidence presented at trial” to determine whether the “jury had substantial evidence to support” no anticipation. *See GlaxoSmithKline*, 313 F. Supp. 3d at 592.

At trial, Dr. Nieh offered un rebutted testimony that DRS 2006 (available over a year before the ’687’s priority date) disclosed all limitations of claims 3 and 7, as Cirba applied them

to DRS 2010. (TT 1344:18-1345:23, 1348:13-1356:19.) See *Cordance Corp. v. Amazon.com, Inc.*, 658 F.3d 1330, 1335 (Fed. Cir. 2011) (approving of invalidity theory mapping prior art in manner that “mirrored [plaintiff’s] infringement theory”); *Vanmoor v. Wal-Mart Stores, Inc.*, 201 F.3d 1363, 1366 (Fed. Cir. 2000) (for anticipation, defendant may rely on plaintiff’s theory without conceding infringement). In response, Dr. Madisetti tried to distinguish DRS 2006 based only on its lack of VM-host affinity rules and FT, which he claimed constituted “business constraints” for infringement purposes. (TT 499:14-501:16, 1594:12-1600:10.) But neither the claims nor the specification mention either feature or limit business constraints to them. Dr. Madisetti did not try to distinguish DRS 2006 on any other basis, and Cirba focused only on DRS 2006’s lack of VM-host affinity rules in its closing argument. (*Id.* 1780:11-1781:15.)

A VM-host affinity rule is a rule that ties particular VMs to particular hosts. (*Id.* 261:9-17, 1260:9-1261:24.) Although DRS can use VM-host affinity rules to determine which VMs to place on which hosts, it can make that determination even when VM-host affinity rules are absent. The ’687 patent, for example, acknowledges that DRS 2006 had VM-VM affinity and anti-affinity rules impacting which VMs could be placed on which hosts. (PTX-1001 at 31:38-44; TT 345:5-14, 1200:6-15, 1201:17-20, 1212:1-1213:1-23, 1260:9-1261:5.)

Anticipation thus reduces to a single issue: whether the claimed business constraints are limited to VM-host affinity rules or FT. The Court’s claim construction order rejected Cirba’s attempt to narrowly construe “business constraints.” (D.I. 356 at 2, 14-15 (rejecting construction of “[w]hat should go together or stay apart based on business criteria”). Applying the Court’s broader construction, VMware offered multiple examples of DRS 2006’s support of “business constraints” to evaluate each VM against each host and other VMs. Using documents and source code, Drs. Waldspurger and Nieh identified the following business constraints that DRS 2006

used to evaluate VMs against hosts and other VMs: (i) “organizational departments” (through resource pools), (ii) “service level agreements” (through system availability targets), (iii) software license agreements (through vMotion licensing), and (iv) “maintenance window” (through maintenance mode). (TT 1205:8-20, 1206:15-25, 1207:9-23, 1211:14-22, 1272:25-1274:1, 1350:25-1352:14, 1353:19-1355:16.) Cirba did not cross-examine either witness about these business constraints, and Dr. Madisetti never rebutted that DRS 2006 had them.

VMware’s unrebutted testimony warrants JMOL of anticipation under Sections 102(a) and (b). *See MobileMedia Ideas LLC v. Apple Inc.*, 780 F.3d 1159, 1172-73 (Fed. Cir. 2015) (reversing JMOL denial where invalidity testimony unrebutted). Cirba relied on the absence of two unclaimed features—VM-host affinity rules and FT—as its lone validity counterargument for DRS 2006, but no reasonable jury could have found no anticipation based on those features. *See Verdegall Bros., Inc. v. Union Oil Co.*, 814 F.2d 628, 632 (Fed. Cir. 1987) (reversing directed verdict denial where patentee relied on lack of unclaimed features to distinguish art); *MobileMedia*, 780 F.3d at 1172-73 (reversing JMOL denial for same reason).

II. JMOL OF NON-INFRINGEMENT FOR THE '367 PATENT IS WARRANTED

A. vROps 6.7 and 7.0 Lack the Accused “Allocation Ratio”

Cirba relied solely on vROps’s “allocation ratio” for claims 1 and 13’s “operational policy.” (TT 608:18–609:3.) No evidence supports that two vROps versions, 6.7 and 7.0, have this “allocation ratio.” Dr. Madisetti analyzed only 7.5 (*id.* 1368:25–1369:7), and Dr. Nieh and Mr. Prathuri offered unrebutted testimony that 6.7 and 7.0 lack the “allocation model” and “allocation ratio” (*id.* 1368:17–1369:7, 1423:22–1424:2). JMOL of non-infringement by pre-7.5 versions is appropriate. A new damages trial also is required in view of the general verdict and lack of evidence of revenues by vROps version.

B. No Substantial Evidence Supports a Connection between “Allocation Ratio” and the Accused vROps Widget Regions, as Claims 1 and 13 Require

Dr. Madisetti asserted that the accused widget infringed based on its “allocation ratio.” (TT 455:4–456:3.) But his testimony was conclusory. Nothing in his lone cited exhibit mentions the “allocation ratio” or explains its effect on the widget’s display. (PTX-1087; TT 443:10-20.) Nor did he explain how the “allocation ratio” relates to “utilization” or performance,” as the claims require. (Cf. TT 1365:11-17 (Dr. Nieh explaining the source code cited for “allocation ratio” actually relates to “capacity”).)

The same was true of Dr. Madisetti’s source code analysis. Although he said that the widget colors are “displayed in the source code in a particular way using specific functions” (*id.* 457:4-19), he never explained what those functions did. Nor did he explain how the source files involved the “allocation ratio” or an “operational policy.” (*Id.*) Dr. Nieh’s unrebutted testing, by contrast, showed that the “allocation model” did not affect the display. (*Id.* 1371:3-1372:18.) As Dr. Madisetti’s conclusory statements cannot support the verdict (and his “black box” opinions should have been excluded regardless), JMOL is proper.

III. JMOL OF NO WILLFUL INFRINGEMENT IS WARRANTED

The Court should grant JMOL of non-willfulness for both patents. No reasonable jury could find that VMware had pre-suit knowledge of the alleged infringement or acted with the requisite intent. *Vehicle IP, LLC v. AT&T Mobility LLC*, 227 F. Supp. 3d 319, 330 (D. Del. 2016); *Halo Elecs., Inc. v. Pulse Elecs., Inc.*, 136 S. Ct. 1923, 1932 (2016) (conduct must be “willful, wanton, malicious, bad-faith, deliberate, consciously wrongful, flagrant, or—indeed—characteristic of a pirate”); *Välinge Innovation AB v. Halstead New Eng. Corp.*, No. 16-1082-LPS-CJB, 2018 WL 2411218, at *9-12 (D. Del. May 29, 2018), *adopted*, D.I. 295 (D. Del. Nov. 6, 2018) (pre-suit knowledge of alleged infringement required).

A. Cirba Offered No Evidence that VMware Willfully Infringed the '687 Patent

DRS 2010's development predated the '687 patent's issuance and came five years before VMware's purported awareness of that patent. (TT 834:5-18, 1254:5-1256:16 (DRS update sold to customers in 2010); *id.* 620:18-624:8 (DRS 2010 required for infringement theory).) *See SRI Int'l, Inc. v. Cisco Sys., Inc.*, 930 F.3d 1295, 1308-10 (Fed. Cir. 2019) (no willfulness where notice letter was sent "years after [defendant] independently developed [and sold] accused systems"). Indeed, the '687 patent describes both DRS and DRS affinity rules as prior art and complementary technology. (PTX-1001 at 5:52-6:4, 25:10-18, 31:29-64, 34:30-60; TT 324:4-326:5, 342:5-343:19, 346:1-21; DTX-4459.) VMware also thought that DRS—which became core to Cirba's case only after the PI hearing—had only "minimal overlap" with Cirba's patented product. (PTX-1043 at 3; TT 1435:8-24.)

That VMware learned of the '687 patent during the 2015 acquisition discussions (TT 884:9-886:16; PTX-1100; PTX 1043 at 4) is insufficient. *See Bayer Healthcare LLC v. Baxalta Inc.*, No. 16-cv-1122-RGA, 2019 WL 4016235, at *8-9 (D. Del. Aug. 26, 2019) (mere knowledge of patent did not show that infringement was "known or so obvious it should have been known"); *Vehicle IP*, 227 F. Supp. at 331 (non-willfulness where plaintiff did "not identify other evidence" "beyond pre-suit knowledge of the patent"). Mr. Prathuri only read the '687 patent's abstract and undertook no assessment of potential infringement. (TT 882:10-23, 884:19-885:15). *See TC Tech. LLC v. Sprint Corp.*, No. 16-cv-153-RGA, 2019 WL 2343627 at *2-4 (D. Del. June 3, 2019) (no willfulness where a party did not investigate potential infringement). No evidence supports that VMware knew of the alleged infringement or intended to infringe when it decided against buying Cirba and independently built features in vROps.

Cirba's own conduct confirms non-willfulness. Before filing suit, Cirba never notified

VMware of infringement. (TT 371:14-372:9, 1391:6-12, 1404:12-18.) Instead, its consistent position was that VMware's products are different from Cirba's patent-practicing product. (*See, e.g.*, DTX-5238 at 9:43-10:10 (Mr. Hillier stating at VMworld 2015 that Cirba's product "doesn't conflict with" and is "complementary" to DRS and "[t]here's nothing that does [what Cirba's product does]."); DTX-4012 at 9 (admitting VMware's products "cannot do what we do"); DTX-4479 at 3 (admitting VMware's products "do[n't] do what we do"), 6, 8-9; DTX-4008 at 5; TT 467:10-20, 594:25-595:8 (Densify practices '687 patent.)) Even at the PI hearing, Cirba failed to persuade the Court that vROps and DRS infringed. (D.I. 138 at 193:25-194:1.)

B. Cirba Offered No Evidence that VMware Willfully Infringed the '367 Patent

Cirba offered no evidence that VMware knew of the '367 patent before Cirba filed suit. Cirba's evidence purportedly showing VMware's pre-suit knowledge of its patent-practicing interface predated the patent's issuance and made no mention of the application that led to it. (TT 894:7-897:13; PTX-1326; PTX-1100.) VMware's accused widget also was introduced before the '367 patent issued and was removed as a default feature before Cirba filed suit (and entirely thereafter). (DTX-5499; TT 1421:3-19, 1423:4-14.)

IV. JMOL, REMITTITUR, AND/OR NEW TRIAL ON DAMAGES IS WARRANTED

The Court should vacate the award and enter a judgment of no damages, or at minimum, remit the damages award or set a new damages trial.

A. Cirba's Failure to Prove Marking Bars Pre-Suit Damages

A patentee whose product practices a patent must mark the product or provide actual notice of infringement before it can recover damages. 35 U.S.C. § 287(a). The statutory requirements are strict. *See Arctic Cat Inc. v. Bombardier Recreational Prod. Inc.*, No. 19-1080, slip op. at 6 (Fed. Cir. Feb. 19, 2020) (Ex. A); *Am. Med. Sys. v. Med. Eng'g Corp.*, 6 F.3d 1523, 1537 (Fed. Cir. 1993). Cirba bore the burden of proving marking compliance. *See Arctic Cat*

Inc. v. Bombardier Recreational Prod. Inc., 876 F.3d 1350, 1368 (Fed. Cir. 2017). Cirba was required to mark because it provided no pre-suit notice (TT 372:3-5) and initially asserted both apparatus and method claims (*e.g.*, D.I. 13 ¶ 5, D.I. 270 at ix-xii). *See Siemens Mobility Inc. v. Westinghouse Air Brake Techs. Corp.*, No. CV 16-284-LPS-CJB, 2018 WL 7893901, at *4 (D. Del. Dec. 17, 2018) (marking statute applicable because “Siemens initially asserted an apparatus claim”). At trial, Cirba admitted that the “Densify” product practices both patents (*id.* 417:23-24, 421:1-422:6, 467:1-20, 594:25-595:8), relieving VMware of any obligation to identify the products that needed to be marked. *See Arctic Cat*, 876 F.3d at 1368.

VMware raised marking in the pretrial order for both patents (D.I. 439, Ex. 5 at 35, 39-40) and moved for JMOL of no marking (TT 1641:11-12). Cirba’s only trial evidence on marking was its CEO’s testimony: “Q. Do you know if Densify marks its products with its patents? A. We do. We mark through the use of our website so that people can go and see – you know, associate our product, our company, and know what patents we have. Q. And when did Densify start doing that? A. March 2015.” (TT 1060:23-1061:4). But there is no evidence that Cirba marked the *Densify product itself*.

Absent such proof, Cirba cannot recover pre-suit damages for either patent. While “virtual marking” might allow Cirba to rely in part on its website, the statute still requires that Cirba have labeled its Densify product “with the word ‘patent’ and an address to a website that associates the patented article with the patent number(s).” *Mfg. Res. Int’l, Inc. v. Civiq Smartscapes, LLC*, 397 F. Supp. 3d 560, 576 (D. Del. 2019); *Nat’l Prods., Inc. v. Arkon Res., Inc.*, No. 18-cv-2936, 2019 WL 1034321, at *15 (C.D. Cal. Jan. 9, 2019); 35 U.S.C. § 287(a).

On JMOL, Cirba’s evidence must be measured against these requirements, independent of how the jury was instructed. *See Markman v. Westview Instruments, Inc.*, 52 F.3d 967, 975 &

n.5 (Fed. Cir. 1995); 9B Wright & Miller § 2537. As Cirba presented no evidence satisfying these requirements, the award of pre-suit damages was improper.

B. Cirba Cannot Recover Pre-Suit Damages Because It Failed to Show VMware Knew of the Induced Infringement Pre-Suit

There is no substantial evidence that VMware knew, pre-suit, “that the induced acts constitute[d] patent infringement.” *Global-Tech*, 563 U.S. at 765. As discussed above, no evidence shows that VMware knew of its customers’ alleged infringement of the ’687 patent as of the March 2015 start date for Cirba’s damages calculations. (TT 1046:6-14.) Mr. Hillier conceded that the first date of actual notice of an infringement claim was the complaint’s filing. (*Id.* 372:3-5.) Absent knowledge or intent, pre-suit damages for inducement are improper.

C. The Damages Award Is Not Correlated With Any Actual Infringement

Even if Cirba had proved some instances of infringement, the damages award still would be unjustified. Reasonable royalty damages must be supported by evidence of the quantity of actual infringement. *See Lucent Techs., Inc. v. Gateway, Inc.*, 580 F.3d 1301, 1334 (Fed. Cir. 2009) (“*Lucent II*”) (reversing JMOL denial and vacating damages award due to insufficient evidence showing how many users had performed the patented method). Cirba’s expert calculated damages based only on all accused product sales. But nothing supports a conclusion that all those sales led to infringement of the ’687 claimed method.²

Cirba “can only receive infringement damages on those devices that actually performed the patented method during the relevant infringement period.” *Cardiac Pacemakers, Inc. v. St. Jude Med., Inc.*, 576 F.3d 1348, 1359 (Fed. Cir. 2009). Cirba needed to introduce sufficient evidence to establish that “[t]he damages award [was] correlated, in some respect, to the extent

² Mr. Bergman based his royalty on sales to third parties, not VMware’s direct infringement. He admitted that he did not calculate a royalty if no customers infringed. (TT 1032:4-14.)

the infringing method [was] used by consumers.” *Lucent II*, 580 F.3d at 1334. The record does not connect the damages award to evidence of how many of VMware’s customers practiced Cirba’s patented methods. Its expert, Jim Bergman, awarded a royalty for each accused VMware sale, totaling over five million units. (TT 1024:21-1025:6.) He did so even though Cirba admitted that many VMware customers do not practice the ’687 method. (*Id.* 632:7-11.)

Dr. Madisetti agreed that the accused DRS products in their default settings would not infringe Cirba’s ’687 patented method. (TT 632:20-23.) To infringe the ’687 claimed method, a customer would need to intentionally take multiple steps to enable and configure various optional DRS rules and non-DRS features to satisfy both Each-Host and Other-VM evaluations for all three constraint types. (*Id.* 1303:23-1304:12.) But, as noted, Mr. Hillier admitted that the Each-Host evaluation “would rarely be the case” for small datacenters (*id.* 1457:4-18) and be “wildly impractical” in very large datacenters (*id.* 358:24-359:7). Dr. Madisetti doubted that small customers would use DRS rules at all. (*Id.* 630:1-8, 632:20-23, 645:18-23). At best, Cirba provided evidence purporting to show that *four* VMware customers performed the ’687 claims.³ (*Id.* 585:17-586:19, 594:4-9.) Four instances of infringement out of almost five million VMware accused units would warrant only *de minimis* damages.

D. Cirba’s Damages Calculation Did Not Apportion for Non-Accused Features

Cirba’s failure to present substantial evidence that its damages calculation reflected only the incremental value of the patented method also supports JMOL. *See Ericsson*, 773 F.3d at 1232-34 (vacating damages award where court failed to instruct jury to limit award to patented

³ As noted above, Cirba’s reliance on a VMware presentation that “92% clusters are DRS enabled,” and “87% have affinity and anti-affinity rules” (PTX-1106 at 6) shows only that DRS customers use some DRS rules. But that does not show that all such customers made the configurations to perform all method steps under Cirba’s infringement theory. (*See also* PTX-2365, PTX-3368, PTX-1648, PTX-2076, PTX-1841.)

technology's value). "[A] jury must ultimately 'apportion the defendant's profits and the patentee's damages between the patented feature and the unpatented features' using 'reliable and tangible' evidence." *Id.* at 1226 (quoting *Garretson v. Clark*, 111 U.S. 120, 121 (1884)).

Mr. Bergman attributed 33% of DRS's value to the '687 patent, but did not show how that percentage reflected the '687 patent's incremental value to DRS. Lacking basic information about DRS, Mr. Bergman pulled his approach from thin air. For example, he did not know whether VM-host affinity rules' addition to DRS in 2010 represented the core value of DRS. (*Id.* 1030:23-1031:5.) Nor did he account for their value to DRS or the limited difference between the 2006 and 2010 versions of DRS for infringement purposes. (*Id.*)

Instead, he merely stated that "the parties in the hypothetical negotiation would have allocated 33% [of the portion of vSphere Enterprise revenue attributable to DRS] to the '687"—without further explanation. (TT 1001:9-12.) Such conclusory testimony is insufficient to support the damages award. *See Whitserve, LLC v. Comput. Packages*, 694 F.3d 10, 33 (Fed. Cir. 2012) (vacating damages award as expert testimony was "conclusory [and] speculative").

E. JMOL Should Be Granted Because Mr. Bergman's Testimony Should Have Been Excluded

JMOL on damages is justified because the only evidence to support the damages award is Mr. Bergman's testimony, which should have been excluded. (D.I. 467 at 2 (denying *Daubert*).)

F. At a Minimum, the Jury's Damages Award Should Be Remitted

Under the Federal Circuit's "maximum recovery rule," the Court may "remit the damage award to the highest amount the jury could 'properly have awarded based on the relevant evidence.'" *IPPV Enters., LLC v. Echostar Commc'ns*, 191 F. Supp. 2d 530, 573 (D. Del. 2002).

The jury awarded \$235,724,765 for the '687 patent and \$1,112,111 for the '367. (D.I. 550 at 6.) Comparing these against Cirba's calculations (PTX-3655, PTX-3605, PTX-3599,

PTX-3602) shows that the jury accepted Cirba's numbers to the dollar. For the '687 patent, its award represents a sum of \$233,653,219 for DRS (PTX-3605) and \$2,071,546 for vROps (PTX-3599). Cirba presented an alternate calculation of \$32,688,453 for DRS damages for the '687 starting in April 2019. (TT 1008:22-1009:4; PTX-3653.) Assuming that calculation is justified, and without waiving VMware's challenges to liability or to set aside or reduce damages further, substituting \$32,688,453 for \$233,653,219 for DRS but leaving the other amounts untouched allows remittitur to \$35,872,110 for DRS due entirely to Cirba's failure to mark. As for vROps, Cirba's failure to separate between pre- and post-suit damages also warrants a new trial.

V. IN THE ALTERNATIVE, THE COURT SHOULD ORDER A NEW TRIAL

A. All the Above Reasons Warrant at Least a New Trial

If the Court does not grant JMOL on any issue discussed above, it should order a new trial. Close scrutiny should be given to a verdict where, as here, the trial was "complicated and deals with a subject matter not lying within the ordinary knowledge of jurors." *Lind v. Schenley Indus., Inc.*, 278 F.2d 79, 90-91 (3d Cir. 1960).

The same reasons for JMOL justify a new trial. For example, Dr. Madisetti's "black-box" infringement options should have been excluded, cannot support the verdict regardless, and warrant a new trial. *See Union Carbide Chems. & Plastics Tech. Corp. v. Shell Oil Co.*, 308 F.3d 1167, 1186 (Fed. Cir. 2002) (affirming new trial grant where expert provided only general and vague opinions). The same is true of Mr. Bergman's opinions. (*See supra* Section IV.E.)

B. The Verdict Also Was Against the Clear Weight of the Evidence

It would be a miscarriage of justice to leave the large damages award in place, as Cirba failed to introduce substantial evidence of infringement. At a minimum, the trial evidence was heavily one-sided against infringement. As discussed above, Drs. Waldspurger and Nieh's unimpeached testimony established that VMware's products do not evaluate a VM against a host

in at least four circumstances. Dr. Nieh corroborated his testimony with experimental testing, which Cirba did not controvert. (TT 1330:9-1338:19.) Cirba did not substantively cross-examine Dr. Nieh at all, and Dr. Madisetti did not refute his testing or results. (*Id.*)

C. A New Trial Also Is Warranted Due to Cirba's Improper Closing Argument

Throughout the trial, VMware emphasized that: (i) Cirba had only recently accused DRS, even though it had been sold since 2010; and (ii) no evidence showed that Cirba thought that DRS infringed Cirba's patents. VMware emphasized this in opening statement (TT 226:4-6), when cross-examining Cirba's President and CEO (*id.* 697:18-698:6, 1073:14-1074:7), and in closing. A key theme of VMware's closing was to ask why no pre-suit communications raised infringement concerns. (*Id.* 1809:5-1811:1, 1823:9-15, 1824:12-14, 1817:10-1825:12.)

In rebuttal, Cirba represented to the jury that VMware "knew darn well why there's no documents of an investigation. Because it is with lawyers and it is privileged. That's why there are no documents." (*Id.* 1879:23-1880:1.) [REDACTED]

[REDACTED] Although VMware has thrice asked Cirba's counsel to identify supporting privilege log entries, Cirba has declined. (D.I. 584.)

Cirba's assertion left the jurors with these misimpressions: (1) Cirba *had been* assessing VMware's potential infringement over the nine years before the lawsuit; (2) VMware and its counsel *knew* of those assessments; and (3) VMware *misled* the jurors by suggesting otherwise. According to Cirba, VMware repeatedly lied to the jurors about a key defense theme. Cirba's highly prejudicial misstatement warrants a new trial. *See Intellectual Ventures I, LLC v. Canon, Inc.*, 104 F. Supp. 3d 629, 659 (D. Del. 2015) (new trial based on improper closing).

VMware did not object to the improper closing statement, as there was no practical way to determine its falsity at that time due, at least in part, to Cirba's enormous privilege log. In any

event, any waiver should be excused in this case, as excusing the “highly prejudicial” misstatement would “result[] in a miscarriage of justice.” *See Wilson v. Vermont Castings, Inc.*, 170 F.3d 391, 395-96 (3d Cir. 1999) (considering unobjected-to issue on this basis).

D. A New Trial on Damages Is Warranted

Cirba’s evidence was insufficient to justify such a large damages award, and the final amount was “against the clear weight of the evidence.” *GlaxoSmithKline*, 313 F. Supp. 3d at 589. These deficiencies are reflected in VMware’s *Daubert* motion (D.I. 417) against Mr. Bergman and its Rule 50(a) statement (TT 1641:25-1642:14), warranting a new trial.

In addition to the reasons in Sections I-IV, the Court should order a new trial based on other errors in Cirba’s approach to damages and the jury’s award. First, the award violates the entire market value rule, as Cirba failed to show that the ’687 patented methods drove demand as to justify including all DRS revenues in the royalty base. *See VirnetX, Inc. v. Cisco Sys., Inc.*, 767 F.3d 1308 (Fed. Cir. 2014). Second, Cirba failed to deduct necessary costs. (TT 1038:18-1041:6; DTX-5525A.) A proper calculation would have deducted 86% of revenues, not the 15% that Mr. Bergman deducted. (*Id.*) Third, no evidence supports Cirba’s inconsistent damages approaches. Mr. Bergman’s income approach for DRS resulted in damages “five times higher” than his market approach for vROps, inflating DRS damages from \$43.6 million to \$233.6 million. (TT 1049:14-1050:2.)

A new trial also is warranted because Mr. Bergman’s opinions were speculative and highly prejudicial. He assessed the ’367 patent’s value based solely on one customer’s purchase of Densify over vROps. (*Id.* 1020:10-1021:2.) Over VMware’s objection, he relied on evidence valuing DRS at “\$550 million a year” and referred to hypothetical revenues of \$6.8 billion. (*Id.* 938:3-15, 951:2-22.) His use of such outsized numbers was prejudicial. *See Uniloc USA, Inc. v.*

Microsoft Corp., 632 F.3d 1292, 1320 (Fed. Cir. 2011).

Finally, Cirba did not separately calculate damages for each patent claim and product. If JMOL is granted on at least one claim or product, the entire award must be vacated to allow redetermination of damages attributable to any surviving patent claims. *See Omega Patents, LLC v. CalAmp Corp.*, 920 F.3d 1337, 1350-51 (Fed. Cir. 2019) (vacating damages award and granting new damages trial after setting aside infringement judgment for certain claims).

VI. CIRBA INC. LACKS STANDING

Cirba Inc.'s agreement with Cirba IP makes clear that it is a bare licensee. (Decl. Ex. 2 at 1 ([REDACTED])); PTX-1249 at 2-3 ([REDACTED]).) This is true even though the agreement calls Cirba Inc. an "exclusive licensee." *Textile Prods., Inc. v. Mead Corp.*, 134 F.3d 1481, 1484 (Fed. Cir. 1998) (reference to "exclusive" license "not controlling"). As Cirba Inc. lacks standing to sue for '687 and '367 patent infringement, the Court should dismiss it from this action. Fed. R. Civ. P. 12(b)(1); *see Sicom Sys., Ltd. v. Agilent Techs. Inc.*, 427 F.3d 971, 976 (Fed. Cir. 2005) ("A nonexclusive license confers no constitutional standing"). The alleged harm to Cirba Inc., a non-party, is irrelevant to damages and injunctive relief. *See LTI Holdings Inc. v. Lippert Components Mfg. Inc.*, No. 15-cv-232, 2015 WL 5125172, at *1 (N.D. Ind. Sept. 1, 2015) (parent "may not sue for injuries to its subsidiary"). If the Court so concludes, this is an additional basis for a new trial, as such harm allegations were central to Cirba's trial presentation and VMware's rebuttal. (*See, e.g.*, TT 1784:17-1785:1, 1886:7-16, 1889:10-1890:18.)

CONCLUSION

JMOL, a new trial, remittitur, and dismissal for lack of standing are warranted.

Dated: March 9, 2020

YOUNG CONAWAY STARGATT &
TAYLOR, LLP

OF COUNSEL:

Arturo J. González
Michael A. Jacobs
Richard S. J. Hung
MORRISON & FOERSTER LLP
425 Market Street
San Francisco, CA 94105
(415) 268-7000
agonzalez@mofo.com
mjacobs@mofo.com
rhung@mofo.com

Deanne E. Maynard
Brian R. Matsui
MORRISON & FOERSTER LLP
2000 Pennsylvania Avenue, NW Suite 6000
Washington, D.C. 20006
(202) 887-1500
dmaynard@mofo.com
bmatsui@mofo.com

Seth P. Waxman
Thomas G. Saunders
WILMER CUTLER PICKERING HALE
AND DORR LLP
1875 Pennsylvania Avenue, NW
Washington, DC 20006
(202) 663-6000
seth.waxman@wilmerhale.com
thomas.saunders@wilmerhale.com

William F. Lee
WILMER CUTLER PICKERING HALE
AND DORR LLP
60 State Street
Boston, MA 02109
(617) 526-6000
william.lee@wilmerhale.com

/s/ Anne Shea Gaza

Anne Shea Gaza (No. 4093)
Robert M. Vrana (No. 5666)
Samantha G. Wilson (No. 5816)
Rodney Square
1000 North King Street
Wilmington, DE 19801
(302) 571-6600
agaza@ycst.com
rvrana@ycst.com
swilson@ycst.com

Attorneys for VMware, Inc.

CERTIFICATE OF SERVICE

I, Anne Shea Gaza, hereby certify that on March 16, 2020, I caused to be electronically filed a true and correct copy of the foregoing document with the Clerk of the Court using CM/ECF, which will send notification that such filing is available for viewing and downloading to the following counsel of record:

Kenneth L. Dorsney, Esquire
Morris James LLP
500 Delaware Avenue, Suite 1500
Wilmington, DE 19801
kdorsney@morrisjames.com

Attorney for Plaintiffs/Counter-Defendants

I further certify that on March 16, 2020, I caused the foregoing document to be served via electronic mail upon the above-listed counsel and on the following:

Courtland L. Reichman, Esquire
Shawna L. Ballard, Esquire
Jennifer Estremera, Esquire
Michael G. Flanigan, Esquire
Joachim B. Steinberg, Esquire
Kate Falkenstien, Esquire
Ariel C. Green, Esquire
Reichman Jorgensen LLP
100 Marine Parkway, Suite 300
Redwood Shores, CA 94065

Sarah O. Jorgensen, Esquire
Reichman Jorgensen LLP
1201 West Peachtree Street, Suite 2300
Atlanta, GA 30309

Christine E. Lehman, Esquire
Reichman Jorgensen LLP
818 Connecticut Ave., N.W., Suite 850
Washington, DC 20006

Jaime F. Cardenas-Navia, Esquire
Wesley Lanier White, Esquire
Khue V. Hoang, Esquire
Reichman Jorgensen LLP
750 Third Avenue, Suite 2400
New York, NY 10017

RJ_densify@reichmanjorgensen.com

Gary J. Toman, Esquire
Weinberg Wheeler Hudgins Gunn & Dial
3344 Peachtree Road NE, Suite 2400
Atlanta, GA 30326
gtoman@wwhgd.com

Peter J. Ayers, Esquire
Law Office of Peter J. Ayers, PLLC
2200 Bowman Avenue
Austin, TX 78703
peter@ayersiplaw.com

Attorneys for Plaintiffs/Counter-Defendants

Dated: March 16, 2020

YOUNG CONAWAY STARGATT &
TAYLOR, LLP

/s/ Anne Shea Gaza
Anne Shea Gaza (No. 4093)
Robert M. Vrana (No. 5666)
Samantha G. Wilson (No. 5816)
Rodney Square
1000 N. King Street
Wilmington, Delaware 19801
agaza@ycst.com
rvrana@ycst.com
swilson@ycst.com

Attorneys for VMware, Inc.